PASSIVE WINDOWS

UNPARALLELED CHOICE OF PASSIVE CERTIFIED PRODUCTS
– OUTWARD OPENING, INWARD OPENING, UPVC, ALUMINIUM, ALUCLAD

5 PASSIVE HOUSE CERTIFIED WINDOW SYSTEMS
What is Passive?

A Passive House combines high-levels of comfort with very low energy consumption. Thermally efficient windows, insulation and heat recovery are key elements. Each Passive House is an active contribution to climate protection. On the outside, Passive Houses are no different from conventional buildings, because the term “Passive House” describes a standard and not a specific construction method.

The Passive House concept can be implemented anywhere in the world. Windows play a critical role in the design of a passive house to deliver optimum comfort, indoor air quality and energy saving. The windows need to achieve a balance between heat loss and solar gain to give comfortable conditions in cold weather without a conventional heating system and in warm weather without air conditioning. The air permeability of the window is key to providing an airtight envelope.

With the introduction of Green Agendas and Europe 2020, each member state of the EU is responsible and focused on achieving designated targets for climate/energy savings to be reached by 2020. This means it is more important than ever that products used are as energy efficient as possible. Munster Joinery specialise in the design and manufacture of windows & doors suitable for passive buildings.

Munster Joinery’s Passiv uPVC, AluClad and Aluminium window ranges have been certified as “Passive house suitable” components by the Passive House Institute – the German based global certification authority for passive housing. The Passive House institute classifies products which it considers to be suitable for passive housing as either phC for certifiable component, phB for a basic component or phA for an advanced component. We offer several windows which have achieved a phA efficiency class.

Munster Joinery’s Passiv range of windows are extremely competitive when compared with other Passive windows which means that the dream of a passive building which uses little or no energy is now available to everyone. Up to now, windows have added huge cost to the passive build. We hope that this range of windows will help make passive standards more accessible to builders and homeowners.
*The windows in our PassiV range are available in double, triple and quadruple glazed format, only the triple glazed windows are Passive House certified components.
Two of our PassiV uPVC window systems have been certified as Passive House suitable components by the Passive House Institute in Darmstadt in Germany.

1. The PassiV uPVC outward opening casement window - Passive house certified
2. The PassiV uPVC inward opening tilt and turn window - Passive house certified

We have developed these windows to allow homeowners, builders, architects and designers to future proof their buildings against upcoming changes in Building Regulations and Building Energy requirements for many years to come. These windows are revolutionary - they make Passive House window standards generally accessible. This level of thermal performance was hitherto available only to the privileged few.

The PassiV uPVC windows come in a range of colours including wood effect finishes to allow you the versatility to give any installation a stylish finish. They are low maintenance and excellent thermal performance making them the ideal product for an energy saving home upgrade.

**Features & Benefits**

- Extremely efficient thermal performance
- Insulation levels to meet Building Energy Requirements for decades to come
- Window U-value as low as 0.5W/m²K (Centre pane U-value of 0.299W/m²K)
- Energy saving glazing, double, triple or quadruple glazed options
- Low emmisivity glass, warm edge spacer bar and Krypton or Argon gas filled
- Excellent airtightness and watertightness ratings
- Extra heavy duty stainless steel friction hinges
- Choice of hardware options
- Lockable handles with night vent position
- Restrictor available to ensure child safety
- Low maintenance
- Available in a range of RAL colours
- Flexible design options
- Suitable for new build or replacements

**Range of colours**

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PassiV AluClad Window

PASSIVE HOUSE CERTIFICATION

Two of our PassiV uPVC window systems have been certified as Passive House suitable components by the Passive House Institute in Darnstadt in Germany.

1. The PassiV AluClad outward opening casement window - Passive house certified
2. The PassiV AluClad inward opening tilt and turn window - Passive house certified

These PassiV AluClad window systems combine the strength, corrosion resistance, durability and recyclability of aluminium on the outside with the aesthetic advantages of a natural finish wooden window on the interior. The exterior frame is manufactured from Aluminium alloy extruded to BS1474. The section is coated with an architectural grade polyester powder to comply with BS6497 : 1984 and BS EN 12206. The systems incorporate a uPVC encased insulating thermal core. Advanced glazing options include double, triple or quadruple glazed units, low emissivity glass coating, warm edge spacer bar, Krypton or Argon gas fill.

The AluClad range allows you to have the warmth, thermal efficiency and aesthetic advantages of a natural finish wooden window on the interior with a durable low maintenance aluminium exterior in a choice of attractive colour finishes.

Features & Benefits

- Powder coated aluminium to exterior face
- Interior frame from laminated pine profiles
- Thermally broken with insulating foam filled uPVC core
- Window U-value as low as 0.5W/m²K (Centre pane U-value of 0.299W/m²K)
- Energy saving glazing, double, triple or quadruple glazed options
- Low emissivity glass, warm edge spacer bar and Krypton or Argon gas filled
- Excellent airtightness and watertightness ratings
- Centrally operated espagnolette locking for enhanced security
- Lockable night vent position
- Restrictor available to ensure child safety
- Low maintenance
- Ironmongery in brass or chrome
- Available in a range of RAL colours
- Flexible design options
- Suitable for new build or replacements

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The windows in our PassiV range are available in double, triple, and quadruple glazed format, only the triple glazed windows are Passive House certified components.
Our PassiV AluP window system has been certified as an advanced Passive House suitable component by the Passive House Institute in Darmstadt in Germany.

The Munster Joinery PassiV Aluminium window combines the structural strength, corrosion resistance, durability and recyclability of aluminium with a thermal performance which is suitable for use in Passive and A rated housing. This is a phenomenal achievement for any aluminium window.

Features & Benefits

- Thermally broken with uPVC encased low conductivity polyurethane foam.
- Window U-value as low as 0.5W/m²K (Centre pane U-value of 0.299W/m²K)
- Energy saving glazing, double, triple or quadruple glazed options
- Low emmisivity glass, warm edge spacer bar and Krypton or Argon gas filled
- Architectural grade powder coat finish in a range of RAL colours
- Excellent airtightness and watertightness ratings
- Heavy duty stainless steel friction hinges
- Choice of hardware options
- Restrictor available to ensure child safety
- Low maintenance
- Available in dual colour options
- Restrictor available to ensure child safety
- Suitable for new build or replacements

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Munster Joinery Passive window ranges have been used in a wide variety of Passive certified projects in Ireland, Northern Ireland and UK. Many of these exemplary buildings have won awards for excellence. Buildings from domestic, commercial, social housing, educational sectors are represented in this portfolio of projects. On these projects we have worked with multidisciplinary teams to achieve a successful outcome.
MUNSTER JOINERY

We are among the largest manufacturers of energy efficient windows and doors in Europe. Founded in 1973, the company has grown year on year, with the continuous development of new products, materials and processes. With operations in Ireland, Northern Ireland and the United Kingdom, the company has a 90,000m² production facility on a 250,000m² site in Ireland with another 22,000m² on a 90,000m² site in the UK.

Research & Design
All our products are entirely designed and developed in-house.

Quality:
All our products are manufactured in our own factory including critical operations such as uPVC extrusion, kiln-drying of timber and manufacture of glazing units. The process is controlled from beginning to end.

Delivery:
We control all aspects of the manufacturing process so we can guarantee our customer high quality products on time. This allows the customer to plan their building schedule accurately, resulting in significant cost savings.

Environment
We have invested heavily in solutions to produce our own energy. This culminated in the installation of 2 wind turbines on site in 2009. In that year we also commissioned a Biomass CHP plant which is fuelled by sawdust and timber off cuts from the factory.
Munster Joinery looks to the future and is environmentally responsible at all times.

We use cutting edge technology to offer our customers eco friendly products. We provide the ultimate in thermal efficiency with several products meeting Passiv House standards.

At Munster Joinery we recognise the increasing importance of waste management and recycling in the Joinery industry. We have a dedicated ‘Waste Management and Recycling’ Division. As a company we are fully self reliant in dealing with all waste and packaging products and all recyclable materials on site. We have also developed an integrated approach to resource efficiency to ensure the most effective use of natural resources.

We have embarked on sourcing a solution for our energy requirements that will significantly reduce our carbon footprint. In the 2000’s we reviewed our energy costs. With rising oil and gas prices and the likely introduction of carbon taxes we felt that we needed to examine means of limiting future energy costs and simultaneously reducing carbon emissions. We have invested heavily in solutions to produce our own energy.

This has culminated in the installation of two wind turbines on our manufacturing site in 2009. Our production facility in Ballydesmond gets much of it’s day to day power needs from 2 wind turbines with an electrical output of 4.2 megawatts. These two wind turbines are capable of powering 2,260 homes annually. The installation will easily achieve annual savings of over 9,000 tonnes of carbon emissions showing Munster Joinery’s commitment to protecting our environment.

In that year we also commissioned the CHP plant which is fuelled by sawdust and timber off cuts from the joinery. Any fuel other than oil/gas are termed “Biomass” and are a “Green Energy Source”. The plant is capable of generating up to 12 Megawatts Thermal (12MW Heat) which is used for space heating and process heating throughout the plant. There is an electrical generator fitted which can produce up to 2.8 Megawatts Electrical (2.8MW Electricity). This has resulted in huge reductions in our carbon footprint and our energy costs.

“Property owners are assured of an energy efficient product from an environmentally aware source together with an efficient service when they purchase Munster Joinery products.”